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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/888,468	06/25/2001	Andrew Dunshea	AUS920010436US1	8684
45327	7590	09/08/2004	EXAMINER	
IBM CORPORATION (CS) C/O CARR LLP 670 FOUNDERS SQUARE 900 JACKSON STREET DALLAS, TX 75202			ELMORE, REBA I	
			ART UNIT	PAPER NUMBER
			2187	
DATE MAILED: 09/08/2004				

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No. 09/888,468	Applicant(s) DUNSHEA ET AL. 	
	Examiner Reba I. Elmore	Art Unit 2187	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 25 June 2001.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 25 June 2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

1. Claims 1-24 are presented for examination.

### ***Drawings***

2. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: elements 121 and 122 referred to on page 3 of the specification. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Flowcharts 3 and 4 are not labeled as 300 and 400 respectively as indicated on page 4 of the specification.

This objection is also made as an objection to the specification.

### ***Specification***

3. The disclosure is objected to because of the following informalities:  
  
phrases such as 'and the like' does not aid in a clear understanding of the specification and need to be deleted from the entire disclosure; and,  
  
elements 121 and 122 do not appear in Figure 1 as discussed on page 3 of the specification, this has also been made as a drawing.

Appropriate correction is required.

4. The specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

***35 USC § 112, 2<sup>nd</sup> Paragraph***

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claim 9 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

It is unclear as to what is meant by the term 'entifying' – line 3, claim 9.

***35 USC § 102***

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 1-24 are rejected under 35 U.S.C. 102(b) as being anticipated by Aggarwal et al.
9. Aggarwal teaches the present invention (claim 1) as claimed including a method to control caching of URL information included in a response as part of the PICS protocol used to

communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the method comprising the steps of:

indicating in the response which of one or more cache proxies is to cache the URL information as determining which of the cache proxies the URL information will be stored for the hierarchy (e.g., see col. 5, line 50 to col. 6, line 14); and,

transmitting the response to the one or more cache proxies of the URL information (e.g., see col. 6, lines 40-60).

As to claim 2, Aggarwal teaches the response includes a URL comprising a significant portion identifier that specifies the portion of the URL that is to be used as a key for the URL information as caching hierarchy labels (e.g., see col. 6, lines 40-60).

10. Aggarwal teaches the present invention (claim 3) as claimed including a method to control caching of URL information included in a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the method comprising the steps of:

indicating in the response that the URL information is to be invalidated as determining whether or not the cached object is obsolete (e.g., see col. 8, lines 42-58); and,

transmitting the response to one or more cache proxies of the URL (e.g., see Figure 4 and col. 8, line 42 to col. 9, line 6).

As to claim 4, Aggarwal teaches the response includes a URL comprising a significant portion identifier that specifies the portion of the URL that is to be used as a key for the URL information (e.g., see col. 7, lines 47-55).

11. Aggarwal teaches the present invention (claim 5) as claimed including a method of managing a cache of a response having a URL, URL information associated with the URL, and a header, the method comprising the steps of:

identifying a cache proxy as serving a cache manager of the URL (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

indicating in the header whether the URL information is to be cached, is not to be cached, is to be cached by the cache proxy serving the cache manager, or is to be invalidated by the one or more cache proxies as part of the caching information included in the PICS protocol (e.g., see col. 5, line 50 to col. 6, line 14).

As to claim 6, Aggarwal teaches the URL is a partial URL, wherein the partial URL comprises a significant portion identifier that specifies the portion of the URL that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

12. Aggarwal teaches the present invention (claim 7) as claimed including a method to control caching of URL information associated with one or more URLs in a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the method comprising the steps of:

identifying a cache proxy as serving a cache manager for one or more URLs (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

receiving by a first cache proxy the response comprising a header and the one or more URLs, the header comprising an indication of whether the URL information is to be cached, invalidated, or only cached by the cache proxy serving the cache manager as part of the caching information included in the PICS protocol (e.g., see col. 5, line 50 to col. 6, line 14);

in response to receiving a header comprising an indication that the URL information is to be cached, storing the URL information in the cache (e.g., see col. 8, lines 42-58);

in response to receiving a header comprising an indication that the URL information is to be cached only by the cache proxy serving the cache manager, determining whether the first cache proxy is the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining the first cache proxy is the cache proxy serving the cache manager, storing the URL information in the cache (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining the first cache proxy is not the cache proxy serving the cache manager, sending the response to the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

in response to receiving a header comprising an indication that the URL information is to be invalidated, preventing the use of the URL information in cache in response to a second request as determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58).

As to claim 8, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprises a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

13. Aggarwal teaches the present invention (claim 9) as claimed including a method to control caching of URL information associated with one or more URLs of a response as part of

the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the method comprising the steps of:

identifying a cache proxy as serving a cache manager for the one or more URLs (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

receiving by a first cache proxy the response comprising a header, the one or more URLs, and the URL information, the header comprising an indication of whether URL information is to be cached only by the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

determining whether the first cache proxy is the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining that the first cache proxy is the cache proxy serving the cache manager, storing the URL information in the cache (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

in response to determining that the first cache proxy is not the cache proxy serving the cache manager, sending the response to the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25).

As to claim 10, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprise a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

14. Aggarwal teaches the present invention (claim 11) as claimed including a method to control caching URL information associated to one or more URLs of a response as part of the



PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the method comprising the steps of:

receiving the response comprising a header, the one or more URLs and the URL information, the header having an indication of whether the URL information is to be invalidated as determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58); and,

in response to receiving a header having an indication that the one or more URLs are to be invalidated, preventing the use of the cached URL information in response to a second request as determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58).

As to claim 12, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprises a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

15. Aggarwal teaches the present invention (claim 13) as claimed including an apparatus adapted to control caching of URL information included in a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the apparatus comprising:

means for indicating in the response which of one or more cache proxies is to cache the URL information as part of the caching decision information (e.g., see Figure 2a and col. 7, line 50 to col. 8, line 25), and,

means for transmitting the response to the one or more cache proxies as a means for passing down the caching decision (e.g., see Figure 2a and col. 7, line 50 to col. 8, line 25).

As to claim 14, Aggarwal teaches the response includes a URL comprising a significant portion identifier that specifies the portion of the URL that is to be used as a key for the URL information (e.g., see col. 5, line 58 to col. 6, line 14).

16. Aggarwal teaches the present invention (claim 15) as claimed including an apparatus adapted to control caching of URL information included in a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the apparatus comprising:

means for indicating in the response that the URL information is to be invalidated as a means for determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58); and,

means for transmitting the response to one or more cache proxies (e.g., see Figure 4 and col. 8, line 42 to col. 9, line 6).

As to claim 16, Aggarwal teaches the response includes a URL comprising a significant portion identifier that specifies the portion of the URL that is to be used as a key for the URL information (e.g., see col. 5, line 58 to col. 6, line 14).

17. Aggarwal teaches the present invention (claim 17) as claimed including an apparatus adapted to manage a cache of a response having a URL, URL information associated with the URL, and a header, the apparatus comprising:

means for identifying a cache proxy as serving a cache manager for the URL (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

means for indicating in the header whether the URL information is to be cached, is not to be cached, is to be cached by the cache proxy serving the cache manager, or is to be invalidated by the cache proxy (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25).

As to claim 18, Aggarwal teaches the URL is a partial, wherein the partial URL comprises a significant portion identifier that specifies the portion of the URL that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

18. Aggarwal teaches the present invention (claim 19) as claimed including an apparatus adapted to control caching of URL information associated with one or more URLs of a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the apparatus comprising:

means for identifying a cache proxy as serving a cache manager for the one or more URLs (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

means for receiving by a first cache proxy the response comprising a header and the one or more URLs, the header having an indication of whether the URL information is to be cached, invalidated, or cached by the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to receiving a header comprising an indication that the URL information is to be cache, means for storing the URL information in the cache (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to receiving a header comprising an indication that the URL information is to be cached by the cache proxy serving the cache manager, means for determining whether the

first cache proxy is the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining the first cache proxy is the cache proxy serving the cache manager, means for storing the URL information in the cache (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining the first cache proxy is not the cache proxy serving the cache manager, means for sending the response to the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

in response to receiving a header comprising an indication that the URL information is to be invalidated, means for preventing the use of the URL information in cache in response to a second request (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

As to claim 20, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprises a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

19. Aggarwal teaches the present invention (claim 21) as claimed including an apparatus adapted to control caching of URL information associated with one or more URLs of a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the apparatus comprising:

means for identifying a cache proxy as serving a cache manager for the one or more URLs (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

means for receiving by a first cache proxy the response comprising a header, the one or more URLs, and the URL information, the header having an indication of whether URL information is to be cache only by the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to receiving a header comprising an indication that the URL information is to be cached by the cache proxy serving the cache manager, means for determining whether the first cache proxy is the cache proxy serving the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25);

in response to determining the first cache proxy is the cache proxy serving the cache manager, means for storing the URL information in the cache (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25); and,

in response to determining the first cache proxy is not the cache proxy serving the cache manager, means for sending the response to the cache manager (e.g., see Figure 2a and col. 7, line 56 to col. 8, line 25).

As to claim 22, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprises a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

20. Aggarwal teaches the present invention (claim 23) as claimed including an apparatus adapted to control caching of URL information associated to one or more URLs of a response as part of the PICS protocol used to communicate caching status in web based communication (e.g., see col. 3, line 37 to col. 4, line 37), the apparatus comprising:

means for receiving the response comprising a header, the one or more URLs, and the URL information, the header comprising an indication of whether the URL information is to be invalidated as a means for determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58); and,

in response to receiving a header comprising an indication that the one or more URLs are to be invalidated, means for preventing the use of the cache URL information in response to a second request as determining whether or not the URL information is obsolete (e.g., see col. 8, lines 42-58).

As to claim 24, Aggarwal teaches the one or more URLs comprise one or more partial URLs, and wherein the one or more partial URLs comprises a significant portion identifier identifying the portion of the one or more URLs that is to be used as a key (e.g., see col. 5, line 58 to col. 6, line 14).

### ***Conclusion***

21. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

22. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Reba I. Elmore, whose telephone number is (703) 305-9706. The examiner can normally be reached on M-TH from 7:30am to 6:00pm, EST.

If attempts to reach the examiner by telephone are unsuccessful, the art unit supervisor for AU 2187, Donald Sparks, can be reached for general questions concerning this application at (703) 308-1756. Additionally, the official fax phone number for the art unit is (703) 746-7239.

Art Unit: 2187

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Tech Center receptionist whose telephone number is (703) 305-3800/4700.



REBA I. ELMORE  
PRIMARY EXAMINER

September 5, 2004